

RID (Rule Interpretation Decision)

(Use additional sheets as necessary)

Type of RID		Requested Response Time	PDSO Assigned RID # 85
Customer RID	<input type="checkbox"/>	24 hours	<input type="checkbox"/>
Internal Staff RID	<input checked="" type="checkbox"/>	5 working days	<input type="checkbox"/>
		As time available	<input checked="" type="checkbox"/>

1. Project Name: Solar Farms

2. Project Number: None

(Plat #, Zoning Case #, etc.)

3. Project Street Address: None

(If not available nearest intersection of two public streets)

4. Applicant Name: Planning and Development Services Staff

5. Applicant Address: 1901 S. Alamo Street

6. Applicant Telephone #: (210) 207-8229

7. Applicant e-mail Address: NA

8. Rule in Question:

Establishment of fixed-panel photovoltaic solar farms within the San Antonio city limits.

9. Applicant's Position:

(Including date position presented and name of city staff point of contact)

Date: October 19, 2009 **Contact:** Andrew Spurgin **Contact Telephone #:** (210) 207-8229

The Unified Development Code does not address fixed-panel photovoltaic solar farms. Recent changes in the nation's energy markets and local energy rates have increased the appeal of alternative energy sources in our community. A policy is needed to provide consistency for customers, protect neighborhoods and create minimum standards for the health, safety and protection of the public welfare.

10. Staff Finding:

(Including date of finding and name of city staff person formulating finding)

Date: October 19, 2009 **Contact:** Andrew Spurgin **Contact Telephone #:** (210) 207-8229

The City of San Antonio recognizes that fixed-panel photovoltaic solar farms provide clean, green electricity and reduce harmful greenhouse gas emissions; however the UDC is silent on this land use. While the UDC exempts CPS Energy distribution facilities from zoning requirements, the solar investment tax credits available from the government are not available to public utilities therefore any solar generation facilities are likely to be

privately owned. For this reason a RID is necessary to address zoning issues for such a facility.

11. Staff Position:

(Including date position presented internally and name of city staff person formulating position)

Date: October 19, 2009 **Contact:** Andrew Spurgin **Contact Telephone #:** (210) 207-8229

The purpose of this RID is to provide standards for fixed-panel photovoltaic solar farms consisting of ground-mounted solar panels that capture energy from the sun and convert it to electricity. The assumptions of this RID are based on a ground-mounted photovoltaic facility using a rammed post construction technique and panels that support the flow of rainwater between each module and the growth of vegetation beneath the arrays and limiting the impacts of stormwater runoff. The rammed post construction technique allows for minimal disturbance to the existing ground and grading of the site. Based on the assumed solar farm design, staff finds the use to be low intensity with minimal trip generation, low amounts of impervious cover, and low emission thus the use is compatible in non-urbanized, low-density areas with other agricultural and scattered industrial uses. Should the use cease operation, the rammed-post panels can be removed to restore the site for agricultural use. The development standards of this RID address areas where UDC requirements are unclear as they relate to the solar farm land use. Any issues not addressed in this RID are subject to the applicable current adopted ordinance or code.

12. Departmental Policy or Action:

(Including date of presentation of policy or action to the applicant, the effective date of the policy or action, schedule for pursuing an amendment to the code if required and signature of the Director of Development Services)

Date of policy/action: : October 19, 2009

Effective Date of policy/action: immediately

The Director concurs with the staff recommendation to create a policy for fixed-panel photovoltaic solar farms and directs the issuance of RID 84 as follows.

(a) Site Development Standards:

1. Lot coverage: No more than 1% of the gross site area shall be occupied by enclosed buildings and structures.
2. Setbacks: A 30-foot side and rear setback shall apply only to the setback area measured from a lot line that abuts a residential use or residential zoning district. The side or rear setback shall be eliminated where the use does not abut a residential use or residential zoning district or the two districts are separated by a public right-of-way.
3. Height: The height of the solar panel arrays shall not exceed twelve feet. The height regulations for all other structures are included in the Unified Development Code, Article III Zoning, Table 310-1.
4. Landscaping buffer: The primary use of the property shall determine the buffer requirement. Where a ground mounted photovoltaic solar farm is the primary use the property shall be considered agricultural for the purposes of buffer requirements.

Consistent with UDC §35-510 (a)(2) agricultural uses are not subject to the buffering requirements of the UDC. There is no requirement for screening from public streets.

5. Storm water management – fixed panel solar arrays shall be considered pervious and any fee in lieu of detention shall be considered based on impervious cover. The impervious cover calculation shall include the support posts of the panels, any roads or driveways, parking areas and buildings on the site.

6. Subdivision: A property used solely for solar energy shall be required to plat however water and sewer connections shall not be required. Suitable fire department access shall be required; outside of the City Limits the County Fire Marshall shall make the determination of required fire access.

7. Signage: Signage shall conform to Chapter 28 of the Municipal Code as well as any sign limitations of the zoning district.

8. Customer owned on-site power lines shall be buried except where connecting to existing overhead utility lines. This requirement shall not apply to fiber optic connections.

9. Fencing: due the unique security requirements of this land use, and to facilitate the educational value of seeing this land use, fencing up to 8 feet in height is permitted provided the fencing material is predominantly open as defined in Appendix A of the UDC, such as chain link, wrought iron or similar. Staff notes that UDC 35-514 and RID #82 allow fences up to 8 feet in height in certain situations and that the use of barbed wire shall be consistent with Section 6-2 of the Building Code.

10. All Municipal Code provisions not specified in this RID are required including but not limited to tree preservation, traffic impact analysis and historic preservation.

(b) Permitted Use:

Ground mounted fixed-panel photovoltaic solar farms shall be permitted (“P”) by right in the following zoning districts: L, I-1, I-2, MI-1, MI-2, ED, RD, FR, QD and SGD. Ground mounted fixed-panel photovoltaic solar farms shall require a specific use authorization (“S”) in the following zoning districts: NC, C-1, C-2, C-3, O-1, O-1.5, O-2, UD, MH, MXD, FBZD and TOD. Ground mounted fixed-panel photovoltaic solar farms are prohibited in all other residential base zoning districts, neighborhood preservation districts and the D Downtown District.

(c) Submittal Requirements:

Building permits are required for solar farms. Plans shall contain the following:

1. A plot plan, drawn to scale, of the property indicating the total site acreage, landscape and buffer areas, tree preservation, location of all structures, the proposed location of the solar panels, the distances of the solar panels to structures on the property as well as distances to the property lines. The plot plan shall include any roads, electric lines and/or overhead utility lines.

2. A description of the electrical generating capacity and means of interconnecting with the electrical grid as coordinated and pre-approved with CPS Energy.

3. Drawings or blueprints of solar panels and arrays in conjunction with the application for a building permit for a solar farm/ solar power plant.

4. Structural engineering analysis for a solar panel, array and its foundation, as applicable.

5. Manufacturer's recommended installations, if any.
6. Documentation of land ownership and/or legal authority to construct on the property.

(d) Compliance with other regulations:

1. Building permit applications for solar farms shall be accompanied by a line drawing of electrical components in sufficient detail to allow for a determination that the manner of installation conforms to the City's adopted Electrical Code and that has been pre-approved by CPS Energy as meeting their Distribution Generation Requirements and Guidelines.
2. An executed interconnection agreement with CPS Energy is required prior to Certificate of Occupancy.
3. Solar farms shall comply with procedures identified in Information Bulletin 153 "Requirements for Photovoltaic Systems" as applicable.

This UDC RID does not waive any requirements of the City's building code, electrical code or other technical codes as applicable.

(e) Discontinuation:

A solar farm shall be considered abandoned after 1 year without energy production. The property owner shall remove all solar farm equipment and appurtenances within 90 days of abandonment thereby providing for potential restoration of site for agricultural use.



Roderick Sanchez, AICP, CBO

Director of Planning & Development Services Department